Economics (ECON)

Courses

ECON 400. Honors Econometrics, 3 or 4 hours.

Data-driven analysis of economic relationships using real-world datasets to estimate parameters, test hypotheses, and employ modern causal inference methods. Topics such as ordinary least squares regression, large and complex datasets. Course Information: 3 undergraduate hours; 4 graduate hours. Prerequisite(s): ECON 120 or ECON 121; and MATH 180; and either ECON 270 or IDS 270.

ECON 436. Mathematical Economics. 3 or 4 hours.

Application of mathematics to theories of consumer and producer behavior, determination of prices in markets, growth and stability features of macroeconomic models. Course Information: 3 undergraduate hours. 4 graduate hours. Prerequisite(s): ECON 220; and MATH 180 or MATH 165.

ECON 450. Business Forecasting Using Time Series Methods. 3 or 4 hours

Autoregressive, moving average, and seasonal models for time series analysis and business forecasting. Forecasting using multi-variable transfer function models. Course Information: Same as IDS 476. 3 undergraduate hours. 4 graduate hours. Prerequisite(s): IDS 371 or ECON 300 or ECON 400; or consent of the instructor.

ECON 453. Economics of Family. 3 or 4 hours.

Microeconomic analysis of families' economic decisions such as marriage, fertility, labor supplies, and consumption. Modern econometric methods will be covered to understand recent literature on the topic. Course Information: 3 undergraduate hours. 4 graduate hours. Prerequisite(s): ECON 220; and ECON 300 or ECON 400. Recommended background: ECON 331 and ECON 353.

ECON 473. Game Theory. 3 or 4 hours.

Introduction to the basic ideas of game theory. Static and dynamic games; mixed strategies, imperfect information; economic, political and biological applications. Course Information: Same as STAT 473. 3 undergraduate hours. 4 graduate hours. Prerequisite(s): STAT 381; or ECON 270; or equivalents.

ECON 475. Urban Economics and Public Policy. 3 or 4 hours.

Microeconomic analysis of individual and firm location choices and outcomes in urban settings. Modern econometric methods to test theories and evaluate policy interventions. Course Information: 3 undergraduate hours; 4 graduate hours. Extensive computer use required. Prerequisite(s): ECON 220; or ECON 300 or ECON 400; and junior standing or above; or consent of the instructor. Recommended background: ECON 328 and ECON 331 and ECON 332.

ECON 481. Mathematical Methods for Economics. 4 hours.

Survey of mathematical techniques used in applied economics theory and econometrics courses.

ECON 482. Probability and Statistics for Econometrics. 4 hours. Introduction to methods in probability and statistics that provide a foundation for the applied econometrics and research design courses.

ECON 499. Independent Study in Economics, 1-3 hours.

Independent study of a topic not covered in a graduate-level course. Course Information: Prerequisite(s): Graduate standing and consent of the director of graduate studies and the instructor.

ECON 501. Applied Microeconomics I. 4 hours.

Microeconomic theory, consumer and producer behavior and determination of market price. Course Information: Prerequisite(s): Grade of C or better in ECON 481 and Grade of C or better in ECON 482.

ECON 502, Applied Microeconomics II, 4 hours.

This second course in microeconomic theory covers game theory, economics of uncertainty, general equilibrium analysis, and welfare economics. Course Information: Prerequisite(s): Grade of C or better in ECON 501 or Grade of C or better in ECON 509. Credit is not given for ECON 502 if the student has credit in ECON 510.

ECON 503. Applied Macroeconomics. 4 hours.

Macroeconomic theory with a deemphasis on mathematical derivations. Course Information: Credit is not given for ECON 503 if the student has credit in ECON 511. Prerequisite(s): Grade of C or better in ECON 481 and Grade of C or better in ECON 482.

ECON 505. Applied Econometrics. 4 hours.

Introduction to econometric theory and regression analysis that deemphasizes mathematical derivations. Course Information: Credit is not given for ECON 505 if the student has credit in ECON 534. Prerequisite(s): Grade of C or better in ECON 481 and Grade of C or better in ECON 482.

ECON 506. Research Design. 4 hours.

Application of econometric techniques to empirical problems in microeconomics with an emphasis on issues of identification and causality. Course Information: Credit is not given for ECON 506 if the student has credit in ECON 535. Prerequisite(s): Grade of C or better in ECON 505 or Grade of C or better in ECON 534.

ECON 507. Reading, Writing and Speaking Economics. 4 hours.

Development of skills in reading, writing and presenting economics. Course Information: Prerequisite(s): Grade of C or better in ECON 481 and Grade of C or better in ECON 482.

ECON 508. Topics in Applied Microeconometrics. 4 hours.

A survey of research in the fields of labor, public, education, health and development economics. Course Information: Prerequisite(s): Grade of C or better in ECON 505 or Grade of C or better in ECON 534; and Grade of C or better in ECON 501 or Grade of C or better in ECON 509; and ECON 507

ECON 509. Microeconomic Theory I. 4 hours.

The fundamentals of microeconomic theory, with a particular emphasis on research-relevant applications of theoretical concepts.

ECON 510. Microeconomic Theory II. 4 hours.

Advanced microeconomic theory. Theories of consumer behavior, uncertainty, general equilibrium, welfare economics. Course Information: Prerequisite(s): ECON 509.

ECON 511. Macroeconomic Theory I. 4 hours.

Static and dynamic theories of income, employment exchange rate and the price level; advanced treatment of consumption, investment, money demand and aggregate production functions; stabilization theory and policy.

ECON 512. Macroeconomic Theory II. 4 hours.

Neoclassical and modern market-clearing models of real and monetary influences on economic growth, inflation and business cycles. Course Information: Prerequisite(s): ECON 511.

ECON 513. Special Topics in Macroeconomics and International Economics. 4 hours.

Intense study of selected research topics in macroeconomics and international economics. Topics may vary. Course Information: Prerequisite(s): ECON 512.

ECON 514. International Trade Policy. 4 hours.

Theoretical models on the causes and consequences of international trade and their empirical validation. Effects of tariff and non-tariff trade policies and preferential trade agreements. Course Information: Prerequisite(s): ECON 509.

ECON 515. International Monetary Policy. 4 hours.

Capital mobility and stabilization policy under fixed and flexible exchange rates; optimum currency areas; reform of international monetary system; problems of liquidity adjustment and confidence. Course Information: Prerequisite(s): ECON 511.

ECON 516. Development Economics. 4 hours.

Theoretical and empirical studies of economic development with intersectoral and international perspectives; structural change and resource reallocation; factor proportions, substitutability, and movement; export-led growth. Course Information: Prerequisite(s): ECON 509.

ECON 520. Microeconomics for Business Decisions. 4 hours.

Efficient allocation of resources by consumers, profit and non-profit firms and government, regulation of industry, monopoly and imperfect competition, business ethics and the market place, efficiency versus equity, social welfare. Course Information: Credit is not given for ECON 520 if the student has credit in ECON 509. Prerequisite(s): MATH 165 or MATH 181 or the equivalent.

ECON 531. Labor Economics I. 4 hours.

Determinants of wage differentials; analysis of determinants and consequences of investments in human capital (schooling, on-the-job training, health); labor mobility, supply and allocation of time. Course Information: Prerequisite(s): ECON 509.

ECON 532. Labor Economics II. 4 hours.

Impact of training, legislation, institutional constraints, and discrimination on the labor market. Focus on demographic groups (race, nativity, ethnicity, gender). Course Information: Prerequisite(s): ECON 509.

ECON 534. Econometrics I. 4 hours.

Detailed treatment of the multivariate linear regression model using matrix algebra. Emphasis on formulating and testing static and dynamic econometric models.

ECON 535. Econometrics II. 4 hours.

Detailed treatment of simultaneous equations estimation; evaluation of alternative estimators; problems of estimation including PROBIT, LOGIT, TOBIT and error component models. Course Information: Prerequisite(s): ECON 534.

ECON 537. Time Series Econometrics. 4 hours.

The role of research in business; forecasting methods and techniques, including models and their applications. Course Information: Same as IDS 582. Prerequisite(s): ECON 534 and at least one statistics course with regression analysis at the 300-level or above.

ECON 538. Business Research and Forecasting II. 4 hours.

The role of research in business; forecasting methods and techniques, including multivariate time series models and their applications. Course Information: Same as IDS 583. Prerequisite(s): ECON 537 or IDS 582; and graduate standing.

ECON 539. Microeconometrics. 4 hours.

Application of econometric techniques to empirical problems in microeconomics with emphasis on issues of identification and causality; and the selection, implementation and testing of statistical models. Course Information: Prerequisite(s): ECON 509 and ECON 535.

ECON 551. Economics of Education. 4 hours.

Basic concepts and tools of economics applied to education. Economic implications of educational outcomes for the economy, and for socioeconomic structure (e.g., income distribution, fertility patterns, ethnic group differences). Course Information: Prerequisite(s): ECON 509.

ECON 552. Economic Demography. 4 hours.

Economic analysis of fertility (number and timing of children), mortality, marriage and divorce, population age structure, the relationship between population growth and economic development. Course Information: Prerequisite(s): ECON 509.

ECON 555. Health Economics I. 4 hours.

Applied economic theory that examines the determinants of health, the market for health insurance, and important determinants of the price and quantity of health care services. Course Information: Prerequisite(s): ECON 509; or consent of the instructor.

ECON 556. Health Economics II. 4 hours.

Economics of health-related behaviors, prevention and health promotion, health disparities, health and development, evaluation of health-related interests. Course Information: Prerequisite(s): ECON 509.

ECON 572. Urban Economics. 4 hours.

Urban economic models and economic analysis of urban problems. Firm location, housing, transportation, local public finance. Course Information: Prerequisite(s): ECON 509.

ECON 575. Public Economics I. 4 hours.

Microeconomic theory as applied to public expenditure decisions; public goods, externalities and asymmetric information; measures of surplus; investment criteria; distributional considerations; shadow prices; social insurance; fiscal federalism. Course Information: Prerequisite(s): ECON 500

ECON 576. Economics of Taxation. 4 hours.

Analysis of the effects of taxation on economic behavior; taxation and public choice; the effects of taxation on the distribution of income; theory and empirical analysis of welfare effects of taxes; optimal tax theory; issues in tax policy and tax reform. Course Information: Prerequisite(s): ECON 509.

ECON 593. Internship Program. 0-8 hours.

Under the direction of a faculty supervisor, students work in government or a private firm on problems related to their major field of interest. Specific credit allotted is determined by the Graduate Curriculum Committee after receiving the supervisor's recommendation. Course Information: Prerequisite(s): Completion of the core courses in the degree program in which the student is enrolled and approval of the internship program by the graduate adviser and the Graduate Curriculum Committee.

ECON 594. Special Topics in Economics. 1-4 hours.

An intensive study of a selected topic in economics. Course Information: May be repeated. Students may register in more than one section per term. Topics vary by sections and by term. Prerequisite(s): ECON 509; and consent of the instructor.

ECON 596. Independent Study. 1-4 hours.

Independent study under faculty supervision. Course Information: Prerequisite(s): Consent of the instructor.

ECON 598. Master's Thesis Research. 0-16 hours.

Independent research leading to an M.A. thesis. Course Information: Satisfactory/Unsatisfactory grading only. May be repeated to a maximum of 8 hours. Students may register in more than one section per term. Prerequisite(s): Grade of C or better in ECON 505 or Grade of C or better in ECON 534; and Grade of C or better in ECON 501 or Grade of C or better in ECON 509 and consent of the chair of the thesis committee.

ECON 599. Ph.D. Thesis Research. 0-16 hours.

Research on a Ph.D. thesis. Course Information: Satisfactory/ Unsatisfactory grading only. May be repeated. Students may register in more than one section per term. Prerequisite(s): Consent of the chair of the thesis committee.